

# BGVL Belimo Globe Valve Linkage

For Use with LV and SV Series Actuators



Technical Data	
Media	chilled or hot water and steam
Applicable Valve Size	1/2" [13], 3/4" [19], 1" [25], 1-1/4" [32], 1-1/2" [38], 2" [50]
Hardware	SS and Nickel plated steel
Frame, plate, base	aluminum
Coupling	GF Nylon supplied
Stroke	0.6" [15 mm] LV, 3/4" [20 mm] SV
Mounting Position	360°
Weight	1.1 lb [0.50 kg]
Media Temp Range (water)	Please Refer to Manufacturer's Valve Specifications

For close-off pressure reference Select Pro or Retrofit Technical Documentation.

## Application

The BGVL kit is designed to easily attach LV and SV series actuators to Belimo Globe Valves. The tapered bonnet and notched stem design allow easy installation of the BGVL on 1/2" to 2" two-way or three-way valves in both normally open and normally closed configurations.

## Operation

The BGVL linkage with actuator will provide 20 mm of linear travel to accommodate a wide range of valve sizes.

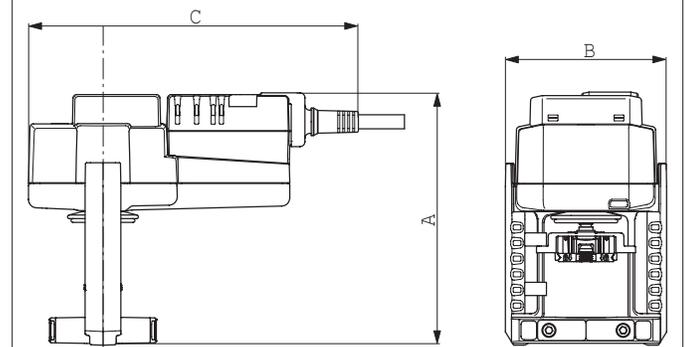
## Default/Configuration

The default set up for a BGVL linkage will be factory installed along with a LV or SV series actuator. Included in the kit will be all the necessary hardware to facilitate mounting to the Belimo Globe Valve.

## Suitable Actuators

	Non-Spring	Electronic fail-safe
BGVL	LVB(X), SVB(X)	LVKB(X), SVKB(X)

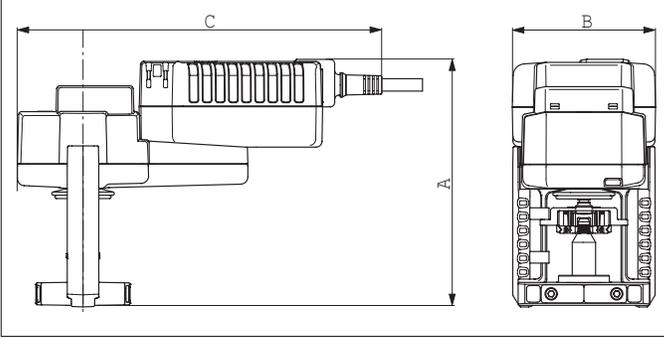
## Dimensions (Inches [mm])



LVB, LVX, SVB, SVX

A	B	C
6" [152]	3.8" [97]	7.9" [201]

## Dimensions (Inches [mm])



A	B	C
6.7" [171]	3.8" [97]	8.1" [206]

# SVX24-MFT Technical Data Sheet

Modulating, Non-Spring Return, Linear, 24 V, Multi-Function Technology®



5-year warranty



Technical Data	
Power Supply	24 VAC, ±20%, 50/60 Hz, 24 VDC, ±10%
Power consumption in operation	1.5 W
Power consumption in rest position	2 W
Transformer sizing	3.5 VA (class 2 power source)
Electrical Connection	18 GA plenum cable, 3 ft [1 m], with 1/2" conduit connector, degree of protection NEMA 2 / IP54
Overload Protection	electronic throughout full stroke
Electrical Protection	actuators are double insulated
Operating Range	DC 2...10 V (default), 4...20 mA w/ ZG-R01 (500 Ω, 1/4 W resistor), variable (VDC, PWM, on/off, floating point)
Operating range Y variable	Start point DC 0.5...30 V End point DC 2.5...32 V
Input Impedance	100 kΩ for DC 2...10 V (0.1 mA), 500 Ω for 4...20 mA, 1500 Ω for PWM, On/Off and Floating point
Position Feedback	DC 2...10 V
Stroke	0.75" [19 mm]
Actuating force motor	340 lbf [1500 N]
Direction of rotation motor	reversible with switch
Position indication	Mechanically, with pointer
Manual override	4 mm hex crank (shipped w/actuator)
Running Time (Motor)	default 90 s, variable 35...150 s
Ambient humidity	max. 95% r.H., non-condensing
Ambient temperature	-22...122°F [-30...50°C]
Storage temperature	-40...176°F [-40...80°C]
Degree of Protection	IP54, NEMA 2, UL Enclosure Type 2
Housing material	Die cast aluminium and plastic casing
Agency Listing	cULus acc. to UL60730-1A/-2-14, CAN/CSA E60730-1:02, CE acc. to 2004/108/EC and 2006/95/EC
Noise level, motor	45 dB(A)
Maintenance	maintenance-free
Quality Standard	ISO 9001
Weight	2.87 lb [1.3 kg]

## Safety Notes

**WARNING:** For Belimo products sold in California: these products do or may contain chemicals which are known to the State of California to cause cancer and or birth defects or other reproductive harms. For more information see [www.p65warnings.ca.gov](http://www.p65warnings.ca.gov).

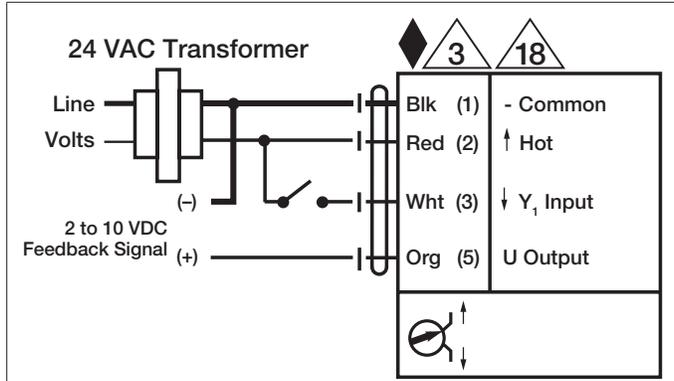
† Use flexible metal conduit. Push the listed conduit fitting device over the actuator's cable to butt against the enclosure. Screw in conduit connector. Jacket the actuators input wiring with listed flexible conduit. Properly terminate the conduit in a suitable junction box. Rated impulse Voltage 800V. Type of action 1. Control pollution degree 3.

**Wiring Diagrams**

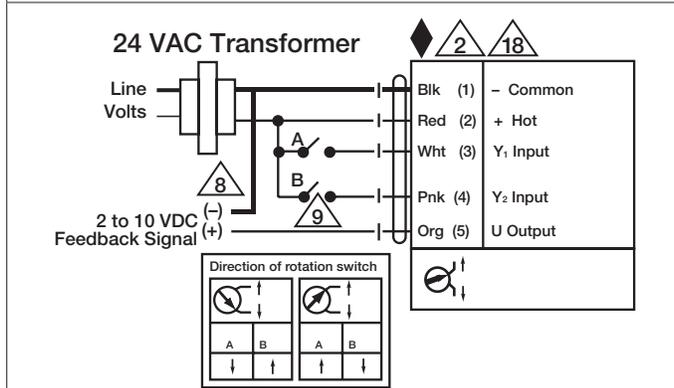
**INSTALLATION NOTES**

- 2** Actuators may be connected in parallel. Power consumption and input impedance must be observed.
- 3** Actuators may also be powered by 24 VDC.
- 7** A 500 Ω resistor (ZG-R01) converts the 4 to 20 mA control signal to 2 to 10 VDC.
- 8** Control signal may be pulsed from either the Hot (Source) or Common (Sink) 24 VAC line.
- 9** For triac sink the common connection from the actuator must be connected to the hot connection of the controller. Contact closures A & B also can be triacs. A & B should both be closed for the triac source and open for triac sink.
- 18** Actuators with plenum cable do not have numbers; use color codes instead.
- Meets cULus requirements without the need of an electrical ground connection.

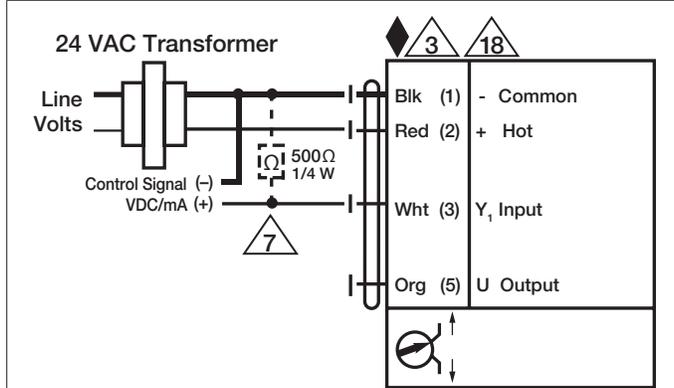
**WARNING! LIVE ELECTRICAL COMPONENTS!**  
 During installation, testing, servicing and troubleshooting of this product, it may be necessary to work with live electrical components. Have a qualified licensed electrician or other individual who has been properly trained in handling live electrical components perform these tasks. Failure to follow all electrical safety precautions when exposed to live electrical components could result in death or serious injury.



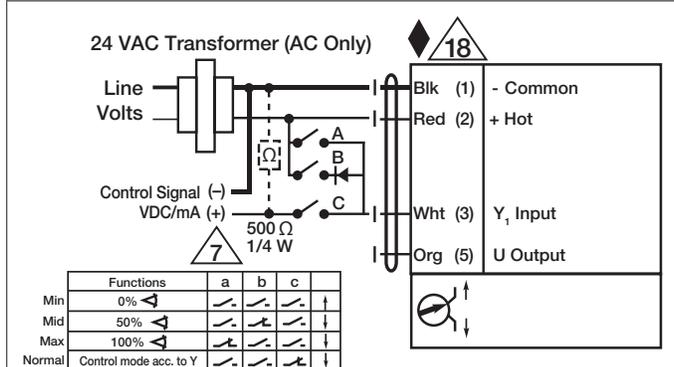
**On/Off**



**Floating Point**



**VDC / 4 to 20 mA**



**Override Control Min, Mid, Max Positions**